

Date: Wed, 13 Jan 93 09:34:51 PST
From: Info-Hams Mailing List and Newsgroup <info-hams@ucsd.edu>
Errors-To: Info-Hams-Errors@UCSD.Edu
Reply-To: Info-Hams@UCSD.Edu
Precedence: Bulk
Subject: Info-Hams Digest V93 #55
To: Info-Hams

Info-Hams Digest Wed, 13 Jan 93 Volume 93 : Issue 55

Today's Topics:

49Mhz Toys to 6 meter -- How?
Any Comments about "Public" Field Day locations
Boatanchors of old (2 msgs)
DSP-12 & RFI
Good Modern Transceivers
ICOM 229H
Keps listings Info
License Delays 10/25 - 1/5
Mods for Heathkit HW-7
Need op for Bangladesh DXpedition
New Licensees: When did you test?
STS-54 Element Set (013.63)
WANTED: HAWAII!!
Yaesu FRG-9600 / PC Interface & Software

Send Replies or notes for publication to: <Info-Hams@UCSD.Edu>
Send subscription requests to: <Info-Hams-REQUEST@UCSD.Edu>
Problems you can't solve otherwise to brian@ucsd.edu.

Archives of past issues of the Info-Hams Digest are available
(by FTP only) from UCSD.Edu in directory "mailarchives/info-hams".

We trust that readers are intelligent enough to realize that all text
herein consists of personal comments and does not represent the official
policies or positions of any party. Your mileage may vary. So there.

Date: Wed, 13 Jan 93 14:12:18 GMT
From: usc!sdd.hp.com!ncr-sd!ncrcae!ncrcol.ColumbiaSC.NCR.COM!
jbate@network.UCSD.EDU
Subject: 49Mhz Toys to 6 meter -- How?
To: info-hams@ucsd.edu

I missed the original posting on how one would go about
converting the toy walkie talkies to 6 meters. We have
a couple of the PlaySkool Lil' Talkers

and would like to modify them to transmit in the amateur band.
My motive? My little girls are working on their licenses. It would be cool for them to be able to talk to their Dad from their little radios to his big one.

Any help would be appreciated.

john bate -- ki7hs/4

Date: 13 Jan 93 13:58:18 GMT
From: news-mail-gateway@ucsd.edu
Subject: Any Comments about "Public" Field Day locations
To: info-hams@ucsd.edu

<in Info-Hams V93 #53 Pete Rossi - WA3NNA writes>

>With Field Day only about 5 months away I have begun to make some
>preliminary plans. I was thinking of going for the extra bonus points
>and organizing a FD operation from "public" place. Looking for comments
>from anyone (or group) that has done this.

>Anyone else ever do this?

Yes. Several times. At a High School stadium, a State Park, a local Science Museum.

>Was it worth the extra problems?

What extra problems? Field Day is not materially different (in the places I have lived and operated) from a private preserve or from a public venue... just more people come by and ask: "Whatcha doin'?" You may even want to have someone assigned to answer that question if you are in a real public place

>Did having lots of people running around tend to cause problems or did
>most of them tend to ignore you?

Hard to characterize. Kids tend to run around, but they are pretty calm if you let them know what is really going on and give them a chance to give a signal report (assuming a control op etc.) and become part of the action. That *is*, after all, one of the main purposes of staging Field Day in a public place -- involve the public!

Then, too, most just ignore you, or respond as they would to any traffic hazard or noisy nuisance ;^)

>Any security problems? Stuff walking away etc?

I'd like to see the John Q. Public who could steal a radio I was using, while I was using it... we never lost anything that way, but shucks, we

lose stuff when we have Field Day in a club members pasture!

>Was the "management" of the area generally receptive to your request
>to operate FD there or did they need a lot of convincing?

As soon as you explain the intent: to demonstrate emergency preparedness and to make amateur radio a part of the exercise, with a test of how many different other stations (numbering in the thousands) your lash-up can contact during the "contest" period...they *want* you to be part of what is going on...usually.

>Problems setting up antennas?

Why more in a public than private place? Field Day antennas are supposed to be temporary and quick to erect, ingenious in design. Why would setting them up in a public place be any more of a problem than trying to hang sky-wires anywhere?

>Interference problems?

Only from passing curious people ;^)

>Other comments?

'Nuff said already

>In general, how receptive are most places (parks, etc,) to Field Day.
Quite.

>Do most places tend to cooperate once they understand what you are
>trying to do?

Yes.

>I can't decide if I *really* want to do this or just go off in the
>woods somewhere by myself :-)

That, is entirely up to you. Good luck, and most of all, HAVE FUN!

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-----  
| Jack GF Hill      Voice: (615)459-2636   root@jackatak.raidernet.com |  
| P. O. Box 1685    modem: (615)377-5980   Compu$erve 76427,31 |  
| Brentwood, TN 37024 Bicycling and SCUBA Diving   Ham Call: W4PPT |  
+-----+
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Date: 13 Jan 93 12:34:30 GMT  
From: dtix!oasys!kstuart@uunet.uu.net  
Subject: Boatanchors of old  
To: info-hams@ucsd.edu
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Ohhh BOY! Yep, the "good old days". When the airwaves were ruled by names such as Lettine, E.F. Johnson, Harvey Wells, RME, Hallicrafters, and, of course, HEATHKIT!

My 90-year-old father non-ham still boasts how he "helped" me to put together a Johnson Viking Ranger transmitter just after I got my General in 1955. The Ranger, as well as other Johnson products, was available in kit form. I still have pictures of my "ideal shack", set up on a small table in my bedroom, with a Johnson Viking Valiant, Heathkit SB-10 single sideband adapter (phasing type - totally missing technology today), a Hollyscratchers SX-71 receiver, and a TATT00 (Totally Automatic Transmitter Turner Onner-Offfer) to run the changeover from receive to transmit - the 1950's forerunner of QSK. In those days, you didn't even need room lights - there was enuf from the dial and pahel lights on the rigs, as well as the blue glows from the mercury vapor rectifiers and VR tubes. You could check on your modulation level by watching the pulsations in the rectifier "bottles".

Yep, hamming was a multisensory experience in those days; a thrill that the newcomer will never get to experience, unfortunately.

How many can remember hitting the transmit switch in the car and hearing the scream of the dynamotor under the hood as it pushed out the plate voltage for the 6146 or 807 final in the transmitter?

AHHHH... Nostalgia...

73. Ken Stuart, W3VVN (40 years at the same call)

Date: Wed, 13 Jan 1993 08:56:43 GMT
From: swrinde!emory!wa4mei!ke4zv!gary@network.UCSD.EDU
Subject: Boatanchors of old
To: info-hams@ucsd.edu

In article <199301121735.AA07798@tilde.csc.ti.com> dube@cpdvax.CSc.ti.COM writes:

>Here's something that ought to bring back memories for the OF on the
>net:

>

>I just obtained a FB copy of a 1957 Heathkit catalog. Among other items
>listed is a DX-20 (\$35.95), DX-35 (\$56.95), and DX-100 (\$189.50).
>you could also get the VF-1 VF0 for \$19.50 and the AR-3 receiver for
>\$30.75.

>

>Those old specs weren't bad, either. The -20 boasted 50 watts from a
>6DQ6A, the -35 ran 65 watts from a 6146, and the -100 claimed 140 watts
>(CW) from a pair of 6146s. For the newer Hams, these were straight
>transmitters. You had to have a separate receiver.

>

>Here are the advertising bullets for the -100:

- > o Phone or CW on 160,80,40,20,15,11,and 10 meters.
- > o Built-in VFO, modulator, and power supplies.

Now let's look at the wonder of 1963, the B&W 6100. It was the first fully frequency synthesized SSB HF amateur transmitter. It covered 160-10 meters with 180 watts PEP. It's introductory price was \$895, though that was reduced to \$495 the following year because hams couldn't afford it. Now factor in the 12x inflation since the 1960s and we have a price schedule as follows:

| | |
|---------------------------|------------|
| DX-20 (CW only) | \$431.40 |
| DX-35 (CW only) | \$683.40 |
| DX-100 (AM,CW) | \$2274.00 |
| B&W 6100 (1963 SSB,AM,CW) | \$10740.00 |
| B&W 6100 (1964 SSB,AM,CW) | \$5940.00 |

Wow! Current prices don't look so bad do they?

Gary

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| | | | | |
|-----------------------------|--|--------------|--|-----------------------------|
| Gary Coffman KE4ZV | | You make it, | | gatech!wa4mei!ke4zv!gary |
| Destructive Testing Systems | | we break it. | | uunet!rsiatl!ke4zv!gary |
| 534 Shannon Way | | Guaranteed! | | emory!kd4nc!ke4zv!gary |
| Lawrenceville, GA 30244 | | | | emory!ke4zv!gary@gatech.edu |

Date: 13 Jan 93 12:16:42 GMT
 From: news-mail-gateway@ucsd.edu
 Subject: DSP-12 & RFI
 To: info-hams@ucsd.edu

I recently purchased an L.L. Grace DSP-12. Although it seems to work well, it is rather noisy in terms of RF. I used shielded DSP-12 <--> radio cable and RS-232 cable, and have wound the DC power lines through a fat toroid. Nevertheless, there are still quite a few loud spurs across the 2-m band (usually right on useful frequencies).

Does anyone have experience in reducing RF radiation from this device?

Michael Owen W9IP
 MROWEN@STLAWU

Date: Wed, 13 Jan 1993 14:47:11 GMT

From: swrinde!zaphod.mps.ohio-state.edu!malgudi.oar.net!news.ysu.edu!do-not-reply-to-path@network.UCSD.EDU
Subject: Good Modern Transceivers
To: info-hams@ucsd.edu

I know that this has been discussed in some ways before. I am going to be in the market for a new HF rig soon. I do mostly CW, like AMTOR and RTTY and Contest some and do a little DXing. I would like the rig to be able to be controllable by a computer and popular software such as CT and a logging program.

The rigs I have come up with are: Yaesu 990, Kenwood 850, Ten Tec Omni VI, Icom 765.

The Yaesu is suppose to be real good with great auto-tuner and a hot receiver, but in current form cannot be controlled correctly by computer (I understand they have fixed this in the 1000). The Kenwood 850 I have heard has a good receiver, but have heard horrible stories about Kenwood service. The Omni VI doesn't have an auto-tuner. I know nothing about eh 765.

I am very interested in good noise and inteference fighting features (like what will the rig really cost with all the necessary filters). Although I am on a waiting list for the DSP kit that was a QST project a couple of months ago.. so may be able to use standard features .. then the DSP.

Thanks in advance for any help. I am really interested in people's experiences who have actually operated or owned the rigs, not just read articles on them. If someone owns more than one of these or operates more than one, I would be really interested in comments.

73s de Cookeville,TN
Jeff, AC4HF

--

Jeff M. Gold, AC4HF
Manager, Academic Computing Support
Tennessee Technological University

Date: Wed, 13 Jan 1993 14:30:20 GMT
From: psinntp!gdstech!gdstech!bat@uunet.uu.net
Subject: ICOM 229H
To: info-hams@ucsd.edu

I own this radio. It is my third Icom, and I love it. I run it out of my cigarette lighter plug, even on 50 watts. It seems immune from alternator whine, and ignition noise. It will behave, even with only 9 volts in. The only problem it had was low mic audio when I got it 2 yrs ago. I called Icom asking about deviation settings. The guy told me right away, that there was an incorrect zener across the electret. He offered to fix it, or tell me how. SO, I got a bigger diode from RS, soldered it in, and problem fixed. Great radio. Go buy one.

--

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*-----*
*      Pat Masterson           | KE2LJ@KC2FD           *
*      Grumman Data Systems    | 516-346-6316.      *
*      M/S D12-25              |                     *
*-----*
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Date: 13 Jan 93 14:10:10 GMT
From: news-mail-gateway@ucsd.edu
Subject: Keps listings Info
To: info-hams@ucsd.edu

N0LSW's request for keps evokes a response that is of benefit to all, please help spread the word:

1) All requests to subscribe to "keps", "amsat-bb", or "ans" should be mailed to "listserv@amsat.org"

2) "keps@amsat.org" and "ans@amsat.org" are only to be used for formatted packet bulletins, and by designated AMSAT personnel providing those functions.

3) The selected Element Sets distributed weekly are chosen based on amateur interest, i.e the OSCARs, weathersats, and visible or public objects of broad general interest (Hubble, SARA, etc.). Requests for additions to the list are entertained if the object fits the above criteria. This is done primarily to keep the size of the packet bulletins down and reduce bandwidth on the various networks.

4) Also, there exists several good landline BBSs to obtain all available elements sets, which are updated more often, if the user has special requirements.

The primary source is Goddard SFC Orbital Information Group. You can subscribe to this free on-line service by writing to:

NASA/Goddard Space Flight Center
Project Operations Branch/513
Attn: Orbital Information Group
Greenbelt, Maryland 20771 USA

Other landline sources which update from the OIG are:

Dallas Remote Imaging Group (DRIG), which is also the AMSAT BBS,
allows access to AMSAT information free of charge: 214-394-7438.

Celestial BBS: 513-427-0674, also free for keplerian bulletins.

Kevin, thanks for your interest. Any questions from anyone about
keps, please ask.

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+-----+
|              73 de Dick N3FKV              |
|              n3fkv@tomcat.gsfc.nasa.gov      |
|  AMSAT Asst. VP for Orbital Data Management |
+-----+
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Date: 13 Jan 93 16:53:14 GMT
From: news-mail-gateway@ucsd.edu
Subject: License Delays 10/25 - 1/5
To: info-hams@ucsd.edu

Hi All

For general interest, I took my upgrade test on October 25,1992 and
received my license from the FCC yesterday January 11, 1993. The License
is Dated January 5, 1993. I also spoke to a new novice yesterday and he
took his test 2 weeks after I took mine, his license is also dated
Jan 5, 1993 (maybe the FCC is catching up ???).

73
Clay
KB2FUR

--
Clayton DeCosterd INTERNET : clay @ drone.hazeltine.com
 COMPUSEVE: 71754,447

Date: Wed, 13 Jan 1993 08:09:26
From: usc!cs.utexas.edu!asuvax!chnews!spence!swilhelm@network.UCSD.EDU
Subject: Mods for Heathkit HW-7
To: info-hams@ucsd.edu

Does anyone know of Heathkit HW-7 modifications that will improve the receiver?

--

| | | |
|------------------|--------|-------------------------|
| Spence Wilhelm | KB5CYX | Intel Corporation |
| (602)554-5050 | | 5000 W Chandler Blvd |
| Mail Stop CH2-47 | | Chandler, Arizona 85226 |

Date: Wed, 13 Jan 1993 14:11:51 GMT
From: psinntp!gdstech!gdstech!bat@uunet.uu.net
Subject: Need op for Bangladesh DXpedition
To: info-hams@ucsd.edu

Phil, lots of us DXers would love to work you in S2-land. But, unless you have a license in hand, you probably wont get on the air. Eric (WZ6C) has been there for over a year, and only got permission to operate for december of 92. He's off the air again. Even with his picture in QST with the PTT guy, he still cant score. I doubt that you guys will get on the air. But, have fun and good luck.

.

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| | | |
|------------------------|---------------|---|
| *-----* | | |
| * Pat Masterson | KE2LJ@KC2FD | * |
| * Grumman Data Systems | 516-346-6316. | * |
| * M/S D12-25 | | * |

Date: Wed, 13 Jan 1993 14:49:42 GMT
From: spsgate!mogate!newsgate!usenet@uunet.uu.net
Subject: New Licensees: When did you test?
To: info-hams@ucsd.edu

I didn't receive a new license but I did apply for and receive a call sign change. I sent to the 610 directly to the FCC on Dec. 7 and received the new license on Jan. 11...5 weeks by my count. This was not an upgrade and so did not go through a VEC. From what a friend told me, a change such as this used to take two to three weeks. Of course, the holidays probably added to the time but it does appear that license processing is taking a lot longer than it used to. Sorry, I don't have any benchmarks for new licenses or upgrades.

Hang in there, it'll eventually arrive.

73.... Mark AA7TA

Date: Wed, 13 Jan 1993 15:50:37 GMT
From: telesoft!garym@uunet.uu.net
Subject: STS-54 Element Set (013.63)
To: info-hams@ucsd.edu

Launch occurred at today (93-1-13) at 13:59:30 UTC. This is a prelaunch
element set for STS-54 that has been rotated to the actual launch time.
--GaryM

STS-54
1 00054U 93013.63354767 .00025000 00000-0 25599-3 0 21
2 00054 28.4694 154.5002 0003379 302.6575 57.3688 15.90451125 23

Satellite: STS-54
Catalog number: 00054
Epoch time: 93013.63354767 =====> (13 JAN 93 15:12:18.52 UTC)
Element set: JSC-002
Inclination: 28.4694 deg
RA of node: 154.5002 deg Space Shuttle Flight STS-54
Eccentricity: .0003379 Rotated Prelaunch Keplerian Elements
Arg of perigee: 302.6575 deg Launch: 13 JAN 93 13:59:30 UTC
Mean anomaly: 57.3688 deg
Mean motion: 15.90451125 rev/day G. L. Carman
Decay rate: 2.5000e-04 rev/day~2 NASA Johnson Space Center
Epoch rev: 2

G.L.CARMAN

--
Gary Morris KK6YB Internet: elements-request@telesoft.com
San Diego, CA, USA Phone: +1 619-457-2700

Date: Wed, 13 Jan 93 13:58:39 GMT
From: sdd.hp.com!ncr-sd!ncrcae!ncrcol.ColumbiaSC.NCR.COM!jbate@network.UCSD.EDU
Subject: WANTED: HAWAII!!
To: info-hams@ucsd.edu

> I would greatly appreciate any help the Net could give me!
>HAWAII, where are you? 8-)
>
> 73!
> Doc Kinne, N2IKR
> kinnerc@snymorva.bitnet

Good luck and 73's.

ki7hs

Greetings...

Suggestions and/or encouragement from anyone who has used a PC to control a FRG-9600 would be very welcome. I really would like to milk a little more utility out of this great receiver. Thanks for your help!

```
----- -!:- -----
Alan V. Cook                      Internet: AVC00K@ananov.remnet.ab.com
Rockwell International            Ham Packet: N7CEU @ WF60
(714) 762-0843                   DoD: #0701
Alternate Internet: Cookav@catipult.anatcp.rockwell.com
```

References <1993Jan9.141959.17257@ke4zv.uucp>,
<1is80mINNb0r@clover.csv.warwick.ac.uk>, <1993Jan12.095904.7329@walter.cray.com>
Reply-To : gary@ke4zv.UUCP (Gary Coffman)
Subject : Re: intermod, overload, desense?

In article <1993Jan12.095904.7329@walter.cray.com> jwl@ferrari.cray.com (Jim

Lynch) writes:

>In article <1is80mINNb0r@clover.csv.warwick.ac.uk>, esrlb@csv.warwick.ac.uk (Mr S Browne) writes:

>>In article <1993Jan9.141959.17257@ke4zv.uucp> gary@ke4zv.UUCP (Gary Coffman) writes:

[As corrected by Simon Browne]

>>>If you want to build a notch filter, install a Tee in your
>>>antenna feedline, attach the feedline to an FM broadcast
>>>receiver, and attach a length of coax to the odd leg that
>>>is slightly more than a quarterwave at the offending
>>>station's frequency. Open this cable at it's free end.
>>>Trim to resonance.

>>>

>>>Ant-----T-----radio

>>>

>>>

>>> open

>

>Would either of you two gentleman care to discuss the characteristics of this
>filter? Like what are the bandpass (bandreject?) characteristics? How would you
calculate

>them? The books discuss l/c filters and active filters, but is there a simple
>way to determine the characteristics of a stub?

This design can be considered a cavity notch filter with the coax serving as a single port cavity. The Q of the filter is dependent on the quality of the coax. Lossy RG58 will perform modestly while 6 1/8 inch airline will be superb. In between, you should find the results a satisfactory compromise between cost and performance.

Going to transmission line wave theory, we can see that a signal enters the stub, is reflected from the open end, and returns to the Tee after travelling 1/2 wave. This puts it 180 degrees out of phase with the signal and causes cancellation. With coax loss taken into consideration, the insertion loss of this stub filter can approach 30 db with airline. This is a Q of about 1000, or a 3 db bandwidth of 100 kHz at a center frequency of 100 MHz.

The Q can be calculated if the loss per foot and characteristic impedance of the coax are known. $Q = X/R$ so setting $X = 50$ for common coax, we divide that by loss resistance to get Q. RG-8 has a loss of about 2 db per 100 feet at 100 MHz. A 10 foot section should then have a loss of 0.2 db, or an equivalent series loss resistance of 1.0471 ohm. That yields a Q of about 47.74 for an ultimate insertion loss of 16.8db. At 100 MHz, that gives a 3db bandwidth of about 2 MHz.

Note that the open coax end represents a voltage maximum. If the coax is shorted at the end, it becomes a voltage minimum thus reversing the

sense of the reflected wave. The signals then *add* at the Tee rather than subtract. The addition can only give 3db "gain", however, so it's not very useful. A shorted 1/2 wave line behaves like an open 1/4 wave line, and vice versa.

Gary

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| | | | | |
|-----------------------------|--|--------------|--|-----------------------------|
| Gary Coffman KE4ZV | | You make it, | | gatech!wa4mei!ke4zv!gary |
| Destructive Testing Systems | | we break it. | | uunet!rsiatl!ke4zv!gary |
| 534 Shannon Way | | Guaranteed! | | emory!kd4nc!ke4zv!gary |
| Lawrenceville, GA 30244 | | | | emory!ke4zv!gary@gatech.edu |

Date: 13 Jan 93 15:01:11 GMT

From: crdgw1!rdsunx.crd.ge.com!crd.ge.com!mallick@uunet.uu.net

To: info-hams@ucsd.edu

References <199301121735.AA07798@tilde.csc.ti.com>,

<1993Jan12.155534.2402@ccsvax.sfasu.edu>,

<1993Jan13.002930.19534@odin.corp.sgi.com>om

Reply-To : mallick@crd.ge.com

Subject : Re: Boatanchors of old

In article <1993Jan13.002930.19534@odin.corp.sgi.com>, adams@chuck.dallas.sgi.com (Charles Adams) writes:

|>

|> Wow, in 1960-1961 school year i ran Apache and NC-300 in my own room with
|> both on a card table. went through 9 ARRL logbooks (remember when we had
|> ^^^^^^^^^^^

|> to keep logs, and i still do) in 9 months on 40 cw. wanna know how i
|> got above 70 wpm? i thought you didn't.

|>

|> refresh my memory. 1 nc-300 + 1 apache = 150 pounds or more.

|>

|> i used two 1n34's back to back across the receiver input with 5 watt 150 volt
|> bulb in line to antenna with apache to antenna, 40 mtr inverted vee. worked
|> qsk without a relay. boy, those were the days..... ;-)

|>

|> 73 de k5fo chuck CP-60

Wow, that must have been some "card table"!

I have got my old Johnson Ranger I running again, and am currently trying to get an old

National NC-240D up an running as the receiver. Going QSK using an old Johnson T/R

switch. I don't think my card table is going to handle it.
--

John A. Mallick WA1HNL
GE Corporate Research and Development
Schenectady, NY 12301

End of Info-Hams Digest V93 #55
